

AMENDMENTS TO THE CLAIMS

The following is a complete, marked-up listing of revised claims with a status identifier in parenthesis, underlined text indicating insertions, and strike through and/or double-bracketed text indicating deletions.

LISTING OF CLAIMS

1. (CURRENTLY AMENDED) A pharmaceutical compound comprising:
a particle-forming protein capable of recognizing a ~~specific cell or tissue~~hepatocyte; and
a disease-treating target-cell-substance fused to the particle-forming protein, wherein the protein forms a nanoparticle encapsulating the target-cell-substance;
the protein is a hepatitis B virus surface-antigen protein; and
the target-cell substance is selected from the group consisting of interferons, hepatocyte growth factors, and interleukins.
- 2-3. (CANCELLED).
4. (WITHDRAWN) The method for producing a pharmaceutical compound comprising according to claim 17, wherein:
the eukaryotic cell is selected from a group consisting of yeast cells, insect cells, and animal cells.
5. (WITHDRAWN) The method of treating a disease or a condition by administering a therapeutically effective amount of a pharmaceutical composition according to claim 18 claim , wherein:
the disease or condition results from a hepatic disease.
6. (CANCELLED).
7. (WITHDRAWN) The method of treating a disease or a condition by administering a therapeutically effective amount of a pharmaceutical composition according to claim 18, wherein:
the pharmaceutical composition is administered using a method selected from a group

consisting of intravenous injection, oral administration, intramuscular administration, intraabdominal administration and subcutaneous administration.

8-16. (CANCELLED).

17. (WITHDRAWN) A method for producing a pharmaceutical compound comprising:
identifying a first gene that encodes for a particle-forming protein, the protein being configured to recognize a specific cell, tissue or receptor;
identifying a second gene that encodes for a target-cell peptide or a target-cell protein, the peptide or target-cell protein being configured to achieve a specific physiological effect;
synthesizing a vector including the first gene and, downstream of the first gene, the second gene;
transforming an eukaryotic cell with the vector to obtain a transformed eukaryotic cell; and
culturing the transformed eukaryotic cell and thereby expressing the first and second genes whereby the particle-forming protein is fused to and encapsulates the target-cell peptide or the target-cell protein and thereby forms the pharmaceutical compound.

18. (WITHDRAWN) A method of treating a disease or a condition by administering a therapeutically effective amount of a pharmaceutical composition to a subject suffering from such a disease or condition wherein the pharmaceutical composition comprises:
a particle-forming protein configured to recognize a specific cell or tissue fused to a target-cell peptide or a target-cell protein configured to achieve a desired physiological effect and further wherein the particle-forming protein forms a nanoparticle encapsulating the target-cell peptide or the target-cell protein; and
a pharmaceutically acceptable excipient.

19. (NEW) The pharmaceutical compound as set forth in claim 1, wherein the disease treating target-cell substance is an interferon for viral hepatitis treatment.

20. (NEW) The pharmaceutical compound as set forth in claim 1, wherein the disease-treating target-cell substance is a hepatocyte growth factor for hepatic cirrhosis treatment.